Work	Order	ID	57959
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Page 1

April 21, 2010 9:18:48 AM

Item ID:

D206-642-541

Accept



Setup Start

Stop



**Revision ID:** 

Item Name:

Replacement Skidtube

**Start Date:** 

21/04/2010

Start Qty: 1.00 Req'd Qty: 1.00



**Cust Item ID:** 

**Customer:** 

Reference:

Approvals: Process Plan:

QC:

**Required Date: 28/04/2010** 

Date:

Tooling:

Date: SPC (Y/N): Date:

Run Start

Stop



Sequence ID/ Work Center ID

**Draw Nbr** 

Operation Description

**Revision Nbr** 

D

Rev M

Set Up/ **Run Hours**  Draw Number

Draw Rev.

Plan Accept Code Qty

Reject Qty

Reject Insp. Number Stamp

D3274

IIN-D206-642

DOCUMENT CONTROL

Memo

0.00

0.00

Photocopy bluefile & type labels per PPP D206-642-541

CHG003

Document Control

W/O:		WORK ORDER CHANGES						t ,
DATE	TE STEP PROCEDURE CHANGE			Ву	Date Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector	
	!							
Part No: PA								
	Resolution: Disposition: Q					Date: _		
NCR:		\	WORK ORE	DER NON-CONFORM	ANCE (NCR	)		
DATE	STEP	Description of NC	Corrective Action Section B			Verification	Approval	Approval
		Section A	Initial Chief Eng			Section C	Chief Eng	QC Inspector
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## Work Order ID 57959

April 21, 2010 9:18:48 AM



Page 2

Item ID:

D206-642-541

Accept



Setup Start



**Revision ID:** 

Item Name:

Replacement Skidtube

**Start Date:** 

21/04/2010

QC:

Start Qty: 1.00

Required Date: 28/04/2010

Req'd Qty: 1.00



**Cust Item ID:** 

**Customer:** 

Reference:

An	provals:
$\Delta \mathbf{p}$	pi vvais.

Process Plan:

Date:

Date:

Tooling:

SPC (Y/N):

Date:

Date:

Run Start

Stop

Sequence ID/ **Work Center ID** 

110



Skidtubes

Skidtubes

Operation Description

Set Un/ **Run Hours**  Draw Number

Draw Plan Rev. Code

Accept Qty

Reject **Qty** 

Reject Insp. Number Stamp

Skidtubes

Memo

0.00

0.00

\*\*\*\*VERIFY AND INSPECT THE MATERIAL PRIOR TO USE\*\*\*\*

1- Bend FWD end of tube using bend prog D3274 FWD dwg D3274, cut fw end of tube with saw table setup D3274.

2- remove fwd indexing ridge as per dwg D3274. Prepare for welding

3- weld fwd cap as per dwg D3274 and Q\$I004 AR Aluminum Rod Batch: MIA507

4- grind fwd cap weld on top surface only

5- Cut AFT end of tube at 170.9" as per dwg D3274 and deburr end.

6-Drill Aft cap pilot hole using DT8025

7 -Cleco DT8025 in position and install pilot hole drill Jig DT8742A,B,C,D. Drill 3/16" pilot holes as per Dwg D3274

8 -Remove inner indexing ridge on aft end of skidtube as per Dwg D3274 scribe batch #

9 -Open aft end cap holes to Ø0.208" as per Dwg.D3274. Deburr aft end.

PE 10/05/04

W/O:		WORK ORDER CHANGES						τ .			
DATE	STEP	PRO	CEDURE CH	IANGE		Ву	Date Qt	Approval Chief Eng / Prod Mgr	Approval QC Inspector		
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Part No:		PAR #:	Fault Cat	tegory:	NC	R: Yes	No <b>DQA</b> :	Date: _			
Resolution: Disposition:			QA	: N/C Cle	osed:	Date: _					
NCR:		\	WORK ORI	DER NON-CONFO	DRMANCE	(NCR	)				
DATE	STEP	Description of NC	Corrective Action		Section B		Verification	n Approval	Approval		
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April 21, 2010 9:18:48 AM



Page 3

Item ID:

D206-642-541

Accept



Setup Start



**Revision ID:** 

Item Name: Replacement Skidtube

**Start Date:** 21/04/2010

Start Qty: 1.00 **Required Date: 28/04/2010** 

Req'd Qty: 1.00



**Cust Item ID:** 

**Customer:** 

Reference:

Ap	prov	als:
	P	****

Process Plan:

Date:\_\_\_\_\_

Tooling:

Date:

Run

Start

Stop



QC:

Date:\_\_\_\_\_

SPC (Y/N):

Date:

Stop



Sequence ID/ Work Center ID

120

HandFinish

Hand Finishing

Operation Description

Chemical Conversion Coat per QSI005 4.1

Memo

Memo

Memo

Set Up/ **Run Hours** 

0.00

0.00

Draw Number

Draw Plan Rev. Code

Accept **Qty** 

Reject Qty

Reject Insp. Number Stamp

130

QC

Quality Control

QC3- Inspect Part Finish

0.00

· ....

140

Quality Control

QC5- Inspect part completeness to step on W/O

0.00

0.00

0 10/05/M

W/O:		WORK ORDER CHANGES					c					
DATE	STEP	PRO	OCEDURE CH	IANGE		Ву	Date Qt	Approval Chief Eng / Prod Mgr	Approval QC Inspector			
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Part No	:	PAR #·	Fault Ca	tegory:	NCE	P: Vos	No DOA:	Doto				
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## Work Order ID 57959

April 21, 2010 9:18:48 AM



Page 4

Item ID:

D206-642-541

Accept



Setup Start

Stop

Start



**Revision ID:** 

Item Name:

Replacement Skidtube

**Start Date:** 

21/04/2010

Start Qty: 1.00

**Required Date: 28/04/2010** Reg'd Qty: 1.00



Date:\_\_\_\_\_

**Cust Item ID: Customer:** 

Reference:

An	prov	ale
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QC:

Process Plan:

Date:

Tooling:

0.00

0.00

SPC (Y/N):

Date: Date:

Stop

Run



Sequence ID/ Work Center ID

150



Skidtubes Skidtubes

**Operation** Description

Skidtubes

Set Up/ **Run Hours**  Draw Number

Draw Plan Rev. Code

Accept Qty

Reject Otv

Reject Insp. Number Stamp

1-Open Ø0.313" and 0.375" crossbolt spacer holes using DT8743 as per Dwg

D3274

2-Deburr crossbolt spacer holes as per Dwg D3274 and blow out chips from inside the tube

3-Bond web in place as per Dwg D3274 & QSI 015.

A/R | Sikaflex-291 | M 11 3435 | 0 Sikaflex expire date:  $\Box 10-11-30$ Start: 10-5-11 Time: 1130ALA

Finish:□

☐Time:☐ (Adhere for 12 hours)

160

QC

QC5- Inspect part completeness to step on W/O

0.00

0.00

Quality Control

Memo

W/O:	WORK ORDER CHANGE				IGES						
DATE	STEP	PRO	CEDURE CH	IANGE	Ву	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector		
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## Work Order ID 57959

April 21, 2010 9:18:48 AM



Page 5

Item ID:

D206-642-541

Accept



Setup Start



Revision ID:

Item Name:

Replacement Skidtube

**Start Date:** 21/04/2010

Start Qty: 1.00

**Required Date: 28/04/2010** Reg'd Oty: 1.00



**Cust Item ID:** 

**Customer:** 

Reference:

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Process Plan:

Date:

Tooling:

Date:

Draw

Number

Run

Start

Reject

Qty

Stop

Stop



Date:

SPC (Y/N):

Set Up/

**Run Hours** 

Date:

Draw

Rev.

Accept

**Qty** 

Number Stamp

Insp.

Reject

Sequence ID/ Work Center ID

170



Skidtubes Skidtubes

Skidtubes

Operation

Description

Memo

0.00

0.00

1-Bend AFT end of tube using bend prog. D3274 AFT as per dwg D3274. Install drop pins in crossbolt spacer holes to maintain web position.

N 10/5/178 ...

Plan

Code

2- DRILL PILOT HOLES FOR WEARPLATES USING D3274-1T2 OPEN HOLES TO 297" Deburr

3-DRILL TOE PIN HOLE .640" DIA AS PER DWG USING DT8935 FWD END OF TUBE

DEBURR INSIDE OF HOLE AS NECESSARY (DO NOT ENLARGE HOLES) REMOVE ANY FOREIGN OBJECTS INSIDE OF TUBES

4- Countersink crossbolt spacer holes as per Dwg D3274

5- prepare for welding

a.M 10-05-19C

180



QC5- Inspect part completeness to step on W/O

62 3.00 Swloslig (4)

Memo

Quality Control

W/O:		WORK ORDER CHANGES							• •	
DATE	STEP	PROC	EDURE CH	IANGE		Ву	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector
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Part No	•	PAR #:	_ Fault Ca	tegory:	N	CR: Yes	No <b>DQ</b>	<b>A</b> :	Date:	
Resolution: Disposition:				Q	A: N/C CI	osed:	-	Date: _		
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DATE	STEP	Description of NC Section A	Initial	Corrective Act Action De		Sign 8	Verific Secti		Approval Chief Eng	Approval QC Inspector
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<b>Work Ord</b> April 21, 2010		959										Page
Item ID: Revision ID:	D206-642-5			Accept					Setup			
Item Name: Start Date: Required Date: Reference:	Replacement 21/04/2010 28/04/2010	Start Qty: 1.00 Req'd Qty: 1.00	1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1		Cust Item I Customer:	D:				Stop		
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	QC:		Date:	SPC (Y/N):	Da	te:				Stop		
Sequence ID/ Work Center II 190	)	Operation Description Skidtubes		Set Up/ Run Hours	Draw Number	Draw Rev.	Plan Code	Accept Qty	Reje Qty		Reject Number	Insp. Stamp
IIIII IIII IIII IIII Skidtubes Skidtubes		Memo 1-Insert D26 D3274. Rer aluminum re	nember to back drill each	0.00 spacers. Weld as per QSI hole before welding the c	004 and Dwg other side. Use	E 14	105/2	/ ',O		_#		

200

QC

QC5- Inspect part completeness to step on W/O

Memo

4-Counterbore 5/16" x 0.750" deep as per Dwg D3274 and deburr.

N 195/20

Quality Control

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W/O:				WORK ORDER CHANGES								
DATE	STEP	PRO	OCEDURE CHAI	NGE	E	Ву	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector		
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DATE	STEP	Description of NC Corrective Action						ation	Approval	Approval		
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Work Ord		959										Page 7
Item ID: Revision ID: Item Name:	D206-642-54 Replacement S			Accept					Setup	Start Stop		
Start Date: Required Date: Reference:	21/04/2010 : 28/04/2010	Start Qty: 1.00 Req'd Qty: 1.00	(1818) 110 110   1818   110 110		Cust Item I	D:				·		1818 III III III IIII
Approvals:	Process Pla	n:	Date:	Tooling: SPC (Y/N):		te:			Run	Start Stop		
Sequence ID/ Work Center II 210 QC Quality Control	D	Operation Description QC10- Inspect visual per	QSI004- ground welds	Set Up/ Run Hours 0.00 0.00	Draw Number	Draw Rev.	Plan Code	Accept Qty	Rej Qty		Reject Number	Insp. Stamp
220  HandFinish  Hand Finishing		Pressure Wash per QSI00	154.3 REALA	5,000 - A	ARO9-042	<b>)</b> '		Œ	)—		) L/0-	5-22

0.00

White Gloss(Ref:4.3.5.1) per QSI005 4.3-Alum M(14207)

START TIME: 1:30 pm OVEN TEMPERATURE: 32001= FINISH TIME: 2:00(0)

230

Powdercoat

Powder Coating

<b>Dart Aerospace L</b>
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W/O:			W	ORK ORDER CHANG	GES				,	•
DATE	STEP	PRO	CEDURE CH	ANGE	В	у	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector
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## Work Order ID 57959

April 21, 2010 9:18:48 AM

**Required Date: 28/04/2010** 



Page 8

Item ID:

D206-642-541

Accept

Setup Start

Stop



**Revision ID:** 

Item Name: Start Date:

Replacement Skidtube

21/04/2010

Start Qty: 1.00

Operation

**Description** 

Rea'd Otv: 1.00



**Cust Item ID:** 

**Customer:** 

Draw

Number

Reference:

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An	O MOST	ale.
ΔU	prov	ais.

Process Plan:

Date:

Tooling:

Date:

Draw

Rev.

Plan

Code

Run Start

Oty



OC:

Date:

**SPC (Y/N):** 

Set Up/

**Run Hours** 

Date:

Reject

Stop

Reject Number Stamp

Insp.

Sequence ID/ Work Center ID

240

OC

Memo

QC3- Inspect Part Finish

0.00

0.00

Accept

Oty

D BL 10-5-27

**Quality Control** 

250

HandFinish Hand Finishing HandFinishing

0.00

1-Install Nut Plate as Apply LPS-3 to Nut Plate and rivets.

A/R□N/A□LPS-3□

2-Install inserts as per Dwg D3274. Uga drop of Sikaflex inside insert holes a

A/R□□Sikaflex-291 □ **A** Sikaflex expire date:

) \$410-507

260

Quality Control

QC5- Inspect part completeness to step on W/O

Memo

Inspect Nut Plate & Inserts

	•								•	
W/O:			WC	ORK ORDER CHAN	IGES					
DATE	STEP	PRO	OCEDURE CHA	NGE		Ву	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector
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Part No		PAR #:								
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NCR:			WORK ORDI	ER NON-CONFORM	MANCE	(NCR	)			
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Work	Orde	r ID	57959
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April 21, 2010 9:18:48 AM

**Required Date: 28/04/2010** 



Page 9

**Item ID:** 

D206-642-541

Accept

Setup Start



**Revision ID:** 

Item Name:

Replacement Skidtube

**Cust Item ID:** 

Stop

**Start Date:** 

21/04/2010

Start Qty: 1.00 Req'd Qty: 1.00

**Customer:** 

Reference:

Approvals:

Process Plan: Date:

Tooling:

Date:

Run

Start



QC:\_\_\_

Date:\_\_\_\_\_ SPC (Y/N):

Date:

Stop

Sequence ID/ **Work Center ID** 

270

Operation Description

Set Up/ **Run Hours**  Draw Number Draw Rev.

Plan Code

Accept Qty

Reject Qty

Reject Insp. Number Stamp

HandFinish

Hand Finishing

HAND FINISHING RESOURCE #1

Memo

0.00

0.00

1-Install wearpads & gaskets as per Dwg D3274.

2-Install ring as per Dwg D3274 A/R□□Sikaflex-291 □

Sikaflex expire date:

3-Inspect for foreign objects as per QSI 024

4-Spray Inside of tube on both sides of web with LPS-3

5-Install Aft Cap and seal with Sikaflex. Clean excess adhesive. A/R \Bigcip Sikaflex-291 \Bigcip \frac{1}{3} \fra

Sikaflex expire date:

O bl 10-5-27

280

QC

QC5- Inspect part completeness to step on W/O

0.00

Memo

Quality Control

W/O:			WC	RK ORDER CHANG	ES					
DATE	STEP	PRO	OCEDURE CHA	NGE	Ву		Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector
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## Work Order ID 57959

April 21, 2010 9:18:48 AM

**Required Date: 28/04/2010** 



Page 10

Item ID:

D206-642-541

Accept

Setup Start



**Revision ID:** 

Item Name:

Replacement Skidtube

**Start Date:** 

21/04/2010

Start Qty: 1.00

Req'd Qty: 1.00



Date:

**Cust Item ID: Customer:** 

Draw

Reference:

Approvals:

Process Plan:

Date:

Tooling:

SPC (Y/N):

Set Up/

Date: Date: Run

Start Stop

Stop

Sequence ID/ Work Center ID

290

Packaging

Packaging

Operation Description

Identify as per dwg & Stock Location:

0.00

0.00

Run Howrs Number

Draw Rev.

Plan Accept Code Qty

Reject Qty

Reject Number

Insp. Stamp

300

Quality Control

QC21- Final Inspection - Work Order Release

0.00

Memo

Memo

0.00

W/O:			W	ORK ORDER CHAN	GES					
DATE	STEP	PRO	PROCEDURE CHANGE					Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector
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#### **Picklist Print**

April 21, 2010 9:18:52 AM

Work Order ID: 57959

D206-642-541

Parent Item Name:

Replacement Skidtube

**Comments:** 

Parent Item:

IPP Rev:B□05.09.23□Revised per D206-642 Rev. J□KJ/JLM

IPP Rev:C 07-02-23

Added SS Wearplates & Gaskets JLM IPP Rev:D 07-12-06 replace NAS1515H3L to D3672-1 DD

IPP Rev:E

08-04-17

as per PAR 08-015 DD verified by:EC

D2600-1-190

Manufactured

No

110

Each

Each

44.0000

1.0000

Start Date: 21/04/2010

Start Qty: 1.00

Extrusion Round 3" 206

Warehouse

Location

Main Warehouse

LG 47575

44 110

Page 1

Required Date: 28/04/2010

Required Qty: 1.00

D3285-1

Manufactured

1. 1

Cap

Loc Qty

Loc Qty

Loc Code

158.0000 1.0000

Location

Main Warehouse

Warehouse

LG

47635 52511

52647

158 74

75 150 Each

1.0000

D3282-041

Float Web (206L/407)

D2649

Cross Bolt Spacer

Manufactured No

Manufactured No

190

Loc Oty

Each

85.0000

Loc Code

1.0000

Warehouse Location

Main Warehouse

LG

85 85

55000

	•							,	•
W/O:			WC	RK ORDER CHANG	iES				
DATE	STEP	PRO	OCEDURE CHAI	NGE	Ву	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector
Part No	:	PAR #:	Fault Cate	gory:	_ NCR: Yes	No <b>DQ</b>	<b>\:</b>	Date:	
	Reso	olution:	Disposition	ı:	_ QA: N/C Clo	osed:		Date:	
NCR:			WORK ORD	R NON-CONFORM	ANCE (NCR	)			
DATE	STEP	Description of NC Section A Initial Action Description			ion B Sign &	Verific		Approval	Approval
		Section A	Chief Eng	Action Description Chief Eng	Date	Section	on C	Chief Eng	QC Inspector

April 21, 2010 9:18:52 AM

Work Order ID: 57959

Parent Item:

Comments:

D206-642-541

Parent Item Name:

Replacement Skidtube

IPP Rev:C

IPP Rev:B□05.09.23□Revised per D206-642 Rev. J□KJ/JLM Added SS Wearplates & Gaskets JLM 07-02-23

IPP Rev:D 07-12-06

replace NAS1515H3L to D3672-1 DD as per PAR 08-015 DD verified by:EC

IPP Rev:E

08-04-17

Manufactured No

190

Each

20.0000

12.0000

Start Date: 21/04/2010

Start Qty: 1.00

Crossbolt Spacer

D3275-1

Warehouse Location

Main Warehouse

LG . 53453 20

Loc Otv

20 250

Loc Code

- ĵ

BE 10/05/20

Required Date: 28/04/2010

Required Qty: 1.00

CR3212-4-03

Purchased No

Each 2,117.000 2.0000



Cherry Rivet

Warehouse	Loc Oty	Loc Code
<b>Location</b>		
Main Warehouse		
ST311	2117	
111359	92	
112314	125	
114436	1900	

D3415-041

Manufactured

No

250 Each

75.0000 1.0000



Nut Plate

Warehouse	Loc Qty	Loc Code
<b>Location</b>		
Main Warehouse		
ST056	75	
33842	75	

1 \$ 10 527.

2 Kl 10-5-27

W/O:			V	ORK ORDER CHANG	BES				·	• •	
DATE	STEP	PROC	EDURE CH	IANGE		Ву	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector	
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NCR:		W	ORK OR	DER NON-CONFORM	ANCE	(NCR)					
DATE	STEP	Description of NC Section A	Initial Chief Eng	Corrective Action Sec Action Description Chief Eng	tion B	Sign & Date	Verifica Section		Approval Chief Eng	Approval QC Inspector	
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## **Picklist Print**

April 21, 2010 9:18:53 AM

Page 3

Required Date: 28/04/2010

Required Qty: 1.00

Work Order ID: 57959

Parent Item:

D206-642-541

Parent Item Name:

Replacement Skidtube

Comments:

IPP Rev:B□05.09.23□Revised per D206-642 Rev. J□KJ/JLM

IPP Rev:C 07-02-23

Added SS Wearplates & Gaskets JLM replace NAS1515H3L to D3672-1 DD IPP Rev:D 07-12-06

IPP Rev:E

08-04-17

as per PAR 08-015 DD verified by:EC

Purchased No

250

Each

724.0000 2.0000

Start Date: 21/04/2010

Start Qty: 1.00

Cherry Rivet

CCR264SS3-3

Warehouse	Loc	Oty		Loc Code	
<b>Location</b>			۲.		
Main Warehouse			ζ.		
ST311		724	•		
111548		4		• 1	
112314		4			
113539		92			
113973		624			
	250	Each		1,912.000	78.0000

ALS4-1032-130

Insert

Purchased

No

Warehouse Loc Qty Loc Code

Location

Main Warehouse

110511

114407

1912 40 1872

78. Bl 10-5-27.

April 21, 2010 9:18:53 AM

Shop Packet Print

Page 3

W/O:			WC	ORK ORDER CHAN	GES				•	• .
DATE	STEP	PRO	OCEDURE CHA	NGE		Ву	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector
					,				<b></b>	
Part No	•	PAR #:	Fault Cate	gory:	NCR:	Yes I	No <b>DQ</b>	A:	Date:	
			Disposition: QA:							
NCR:		1	WORK ORD	ER NON-CONFORM	IANCE	(NCR	)			
DATE	STEP	Description of NC			ction B		Verification		Approval	Approval
DAIL	JILF	Section A	Initial Chief Eng	Action Description Chief Eng	scription   Sign &   Section			Chief Eng	QC Inspector	
		, , , , , , , , , , , , , , , , , , , ,						1		

### · Picklist Print

April 21, 2010 9:18:53 AM

Page 4

**Required Date: 28/04/2010** 

Required Qty: 1.00

Work Order ID: 57959

Parent Item:

**Comments:** 

D206-642-541

Parent Item Name:

Replacement Skidtube

IPP Rev:C 07-02-23 IPP Rev:D

07-12-06 IPP Rev:E 08-04-17

IPP Rev:B□05.09.23□Revised per D206-642 Rev. J□KJ/JLM Added SS Wearplates & Gaskets JLM

replace NAS1515H3L to D3672-1 DD as per PAR 08-015 DD verified by:EC

D3536-15

Manufactured No

Manufactured

270

Each

19.0000 1.0000

**Start Date: 21/04/2010** 

Start Qty: 1.00

Gasket

Warehouse	<u>L</u>	oc Oty	Loc Code	
<b>Location</b>				
Main Warehouse				
FP		19		
51600 56055 <b>/</b>		7		
56055		12		
	270	Each	16.0000	1.0000

Gasket

D3536-23

Warehouse Location	Loc Qty	Loc Code
Main Warehouse		
FP	4	
53468	4	
Main Warehouse		
FP011	12	
<sub>57529</sub> √	12	

1 BR 16-5-27.

W/O:			WC	RK ORDER CHAN	GES	<del></del>			•		
DATE	STEP	PR	OCEDURE CHA	NGE	Ву	Date Qty Approval Chief Eng / Prod Mgr			Approval QC Inspector		
Part No		PAR #:									
	Res	olution:	Disposition: QA			losed:	sed: Date:				
NCR:			WORK ORDI	ER NON-CONFORM	ANCE (NC	R)					
DATE	STEP	Description of NC	<del></del>		ction B	Verific	cation	Approval	Approval		
		Section A	Initial Chief Eng	Action Description Chief Eng	Sign Date		on C	Chief Eng	QC Inspector		
							••				
							İ				
	3										

### · Picklist Print

April 21, 2010 9:18:53 AM

Page 5

Required Date: 28/04/2010

Required Qty: 1.00

Work Order ID: 57959

Parent Item:

D206-642-541

Parent Item Name:

Replacement Skidtube

**Comments:** 

IPP Rev:B□05.09.23□Revised per D206-642 Rev. J□KJ/JLM

IPP Rev:D

IPP Rev:C 07-02-23 Added SS Wearplates & Gaskets JLM□ 07-12-06 replace NAS1515H3L to D3672-1 DD

IPP Rev:E

08-04-17

as per PAR 08-015 DD verified by:EC

Manufactured No 270

Each

18.0000 1.0000

**Start Date:** 21/04/2010

Start Qty: 1.00

Gasket

D3536-35

Warehouse	Loc	e Qty	Loc Code		
<b>Location</b>					
Main Warehouse					
FP 58631		6			1 Bl 10-5-27
51628		6			
Main Warehouse					
FP012		12			
57530		12			
	270	Each	11.0000	1.0000	

D3536-39

Manufactured No

Gasket

Warehouse	Loc Oty	Loc Code
<b>Location</b>		
Main Warehouse		
FP	11	
48161	1	
48161 51637	10	

The 10-5-27.

W/O:			W	ORK ORDER CHANG	GES				·	4
DATE	STEP	PRO	OCEDURE CHA	NGE	В	У	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector
Dowt No.										
Part No			Fault Category: NCR: Ye							
	He	esolution:							Date:	
NCR:			WORK ORD	ER NON-CONFORM	IANCE (N	ICK)				
DATE	STEP	Description of NC	Initial	Corrective Action Sec Action Description	ction B	gn &	Verification		Approval	Approval
		Section A	Chief Eng	Chief Eng		ate	Secti	on C	Chief Eng	QC Inspector
						77 1		W		
					1					
<u> </u>										
•										

#### **Picklist Print**

April 21, 2010 9:18:53 AM

Page 6

Required Date: 28/04/2010

Required Qty: 1.00

Work Order ID: 57959

Parent Item:

D206-642-541

Parent Item Name:

**Comments:** 

Replacement Skidtube

IPP Rev:B□05.09.23□Revised per D206-642 Rev. J□KJ/JLM IPP Rev:C 07-02-23 Added SS Wearplates & Gaskets JLM□

IPP Rev:D

IPP Rev:E 08-04-17

07-12-06 replace NAS1515H3L to D3672-1 DD as per PAR 08-015 DD verified by:EC

D3535-15

Manufactured No

Manufactured

270

Each

14.0000 1.0000

Start Date: 21/04/2010

Start Qty: 1.00

Wearshoe

Warehouse	<u>L</u>	oc Qty	Loc Code	
<b>Location</b>				
Main Warehouse				
FP		14		
53462 56053		4		
56053		10		
	270	Each	16.0000	1.0000

D3535-35

Wearshoe

Warehouse	Loc Oty	Loc Code
<b>Location</b>		
Main Warehouse		
FP	5	
51608	5	
Main Warehouse		
FP018	11	
57528	11	

- 1 pl 10-5-27.

pf 10-5-27

## · Picklist Print

April 21, 2010 9:18:53 AM

Page 7

Required Date: 28/04/2010

Required Qty: 1.00

Work Order ID: 57959



Parent Item:

D206-642-541

Parent Item Name:

Replacement Skidtube

**Comments:** 

IPP Rev:B□05.09.23□Revised per D206-642 Rev. J□KJ/JLM

IPP Rev:D 07-12-06

IPP Rev:C 07-02-23 Added SS Wearplates & Gaskets JLM□

No

IPP Rev:E 08-04-17

replace NAS1515H3L to D3672-1 DD as per PAR 08-015 DD verified by:EC

D3535-39

Manufactured No

Manufactured

270

Each

9.0000

1.0000

Start Date: 21/04/2010

Start Qty: 1.00

Wearshoe

Warehouse	Loc Q	<u>ty</u>	Loc Code			
<b>Location</b>						
Main Warehouse						
FP /		9				
51619		9				
	270	Each	24.0000	1.0000		

D3535-23



Wearshoe

Warehouse	Loc Qty	Loc Code

Location Main Warehouse FP 53467

56054 Main Warehouse

> FP21 57730

11 10

> 13 13

- BR 10-5-27.

1/2/10-5-27

#### **Picklist Print**

April 21, 2010 9:18:53 AM

Page 8

Required Date: 28/04/2010

Required Qty: 1.00

Work Order ID: 57959

Parent Item:

D206-642-541

Parent Item Name:

Replacement Skidtube

Comments:

IPP Rev:B□05.09.23□Revised per D206-642 Rev. J□KJ/JLM IPP Rev:C 07-02-23

Manufactured

IPP Rev:D

07-12-06 08-04-17

Added SS Wearplates & Gaskets JLM

replace NAS1515H3L to D3672-1 DD as per PAR 08-015 DD verified by:EC

D3537-3

Manufactured No 270

Each

24.0000 1.0000

**Start Date: 21/04/2010** 

Start Qty: 1.00

Wearpad

Warehouse	Loc Qty	Loc Code	2	
<b>Location</b>				
Main Warehouse				
FP	:	2		
35697	:	2		
Main Warehouse				
FP17	22	2		$$ $\mathcal{N}$ $\mathcal{N}$
57512	23	2		1 1 10-5
•	270	Each 51.0000	9.0000	, , ,

D3537-1

Wearpad

Warehouse Location	Loc Oty	Loc Code
Main Warehouse FP 57 256	9	
55465	9	
Main Warehouse		
FP17 <b>577/3</b>	42	
57510	42	

80.0000

AN960C10L

washer

Purchased

NAS 1149003327

No

Each 114341

0.0000

#### · Picklist Print

April 21, 2010 9:18:53 AM

Page 9.

Required Date: 28/04/2010

Required Qty: 1.00

Bl 10-5-07.

Work Order ID: 57959

Parent Item:

D206-642-541

Parent Item Name:

Replacement Skidtube

Comments:

IPP Rev:B□05.09.23□Revised per D206-642 Rev. J□KJ/JLM IPP Rev:C 07-02-23

IPP Rev:D

07-12-06

Added SS Wearplates & Gaskets JLM replace NAS1515H3L to D3672-1 DD

IPP Rev:E 08-04-17 as per PAR 08-015 DD verified by:EC

AN960C416

Purchased

Manufactured

No

No

270

Each

376.0000 1.0000

**Start Date: 21/04/2010** 

Start Qty: 1.00

washer

D3672-1

Warehouse

Loc Oty

Loc Code

Location

Main Warehouse

ST346

100993

376

Each

376

1,581.000 2.0000

Phenolic Washer

Warehouse Loc Oty Loc Code

270

Location Main Warehouse

47628

51674

52505

ST077

1581 81 500

1000

2/1/05-27

## **Picklist Print**

April 21, 2010 9:18:53 AM

Page 10

**Required Date: 28/04/2010** 

Required Qty: 1.00

Work Order ID: 57959

Parent Item:

D206-642-541

Parent Item Name: **Comments:** 

Replacement Skidtube

IPP Rev:B□05.09.23□Revised per D206-642 Rev. J□KJ/JLM IPP Rev:C 07-02-23 Added SS Wearplates & Gaskets JLM□

IPP Rev:D

07-12-06 replace NAS1515H3L to D3672-1 DD

Purchased

as per PAR 08-015 DD verified by:EC IPP Rev:E 08-04-17

Purchased

No

270

Each

1,799.000 80.0000

**Start Date: 21/04/2010** 

Start Qty: 1.00

BOLT

AN3C4A

	Warehouse	<u>L</u>	oc Qty	Loc Code		
	<b>Location</b>					1 1
	Main Warehouse	_				30 BL16-5-27
	ST350 <b>//4523/</b> 114103	•	1799			30 BL16-5-07
	114103		501			
	114108		300			
	114330		498			
	114416		500			
No		270	Each	533.0000	1.0000	

AN4C5A

**BOLT** 

Warehouse Location	Loc Oty	Loc Code
Main Warehouse		
ST346	533	
110552	33	
112243	500	

1 bl 10-5-27

## · Picklist Print

April 21, 2010 9:18:53 AM

Page 11

Required Date: 28/04/2010

Required Qty: 1.00

\_bl 10-5-27.

Work Order ID: 57959

Parent Item:

D206-642-541

Parent Item Name:

Replacement Skidtube

Comments:

IPP Rev:B□05.09.23□Revised per D206-642 Rev. J□KJ/JLM

IPP Rev:C 07-02-23

Added SS Wearplates & Gaskets JLM replace NAS1515H3L to D3672-1 DD IPP Rev:D 07-12-06

IPP Rev:E

08-04-17

as per PAR 08-015 DD verified by:EC

No

Manufactured

270

Each

32.0000 1.0000

Start Date: 21/04/2010

Start Qty: 1.00

Aft Cap

D2646

Warehouse	Lo	oc Oty	Loc Code				
<b>Location</b>							
Main Warehouse							
FP6		28					
52663		28					
Main Warehouse							
fp7 /		4					
52663 V		4					
	270	Each	31.0000	1.0000			

D3413-1

Manufactured No

Ring

Warehouse	Loc Qty	Loc Code
<b>Location</b>		
Main Warehouse		
ST473	31	
51586	8	
53446	23	
58524		



1	DESIG	N	DRAWN BY	
		°CP	PH	DART AEROSPACE USA, INC.
	CHECK	KED A	APPROVED 4	DRAWING NO. REV. D
ı		#	<del>-   </del>	D3274 SHEET 1 OF 4
	DATE			TITLE SCALE
	06.1	2.19		SKIDTUBE ASSEMBLY NTS
	Α		04.03.15	NEW ISSUE
	В		04.08.09	MOVE SADDLE HOLE: 42.14 WAS 42.76
	C		05.03.16	ADD -043; NEW INSERTS
	D		06.12.19	NEW INSERTS, SS WEARSHOE + GASKET



Qty -041	Qty -043	Part Number	Description
Х		D3274-041	SKIDTUBE ASSEMBLY
	Х	D3274-043	SKIDTUBE ASSEMBLY
1	1	D2600-1-240	EXTRUSION
1	1	D2646	AFT CAP
12	12	D2649	CROSS BOLT SPACER
12	37	D3275-1	CROSS BOLT SPACER
1	1	D3282-041	FLOAT WEB
1	1	D3285-1	CAP
1	1	D3413-1	RING
1	1	D3415-041	NUT PLATE
1	1	D3535-15	WEARSHOE
1	1	D3535-23	WEARSHOE
1	1	D3535-35	WEARSHOE
1	1	D3535-39	WEARSHOE
1	1	D3536-15	GASKET
1	1	D3536-23	GASKET
1	1	D3536-35	GASKET
1	1	D3536-39	GASKET
9	9	D3537-1	WEARPAD
1	1	D3537-3	WEARPAD
78	78	ALS7-1032-130	INSERT (or AKS4-1032-130, ALS4-1032-130, AELS-1032-130
80	80	AN3C4A	BOLT
1	1	AN4C5A	BOLT
1	1	AN960C416	WASHER UNC
80	80	AN960C10L	WASHER SUP
2	2 .	CCR264SS3-3	RIVET
2	2	CR3212-4-03	RIVET
2	2	NAS1515H3L	WASHER

SHOP COPY RETURN TO ENGINEERING VTROLLED COPY

TT TO AMENDME VT THOUT NOTICE ORK ORDER

## GENERAL NOTES:

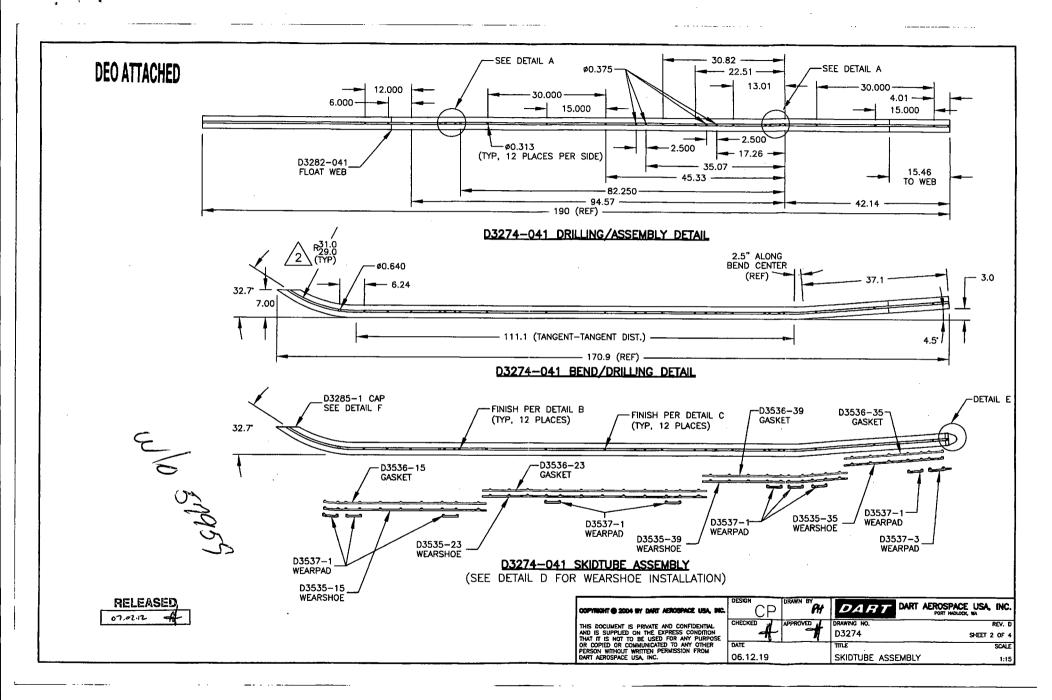
- 1. TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED.
- 2. DAMAGE TOLERANCE ON FWD BEND:

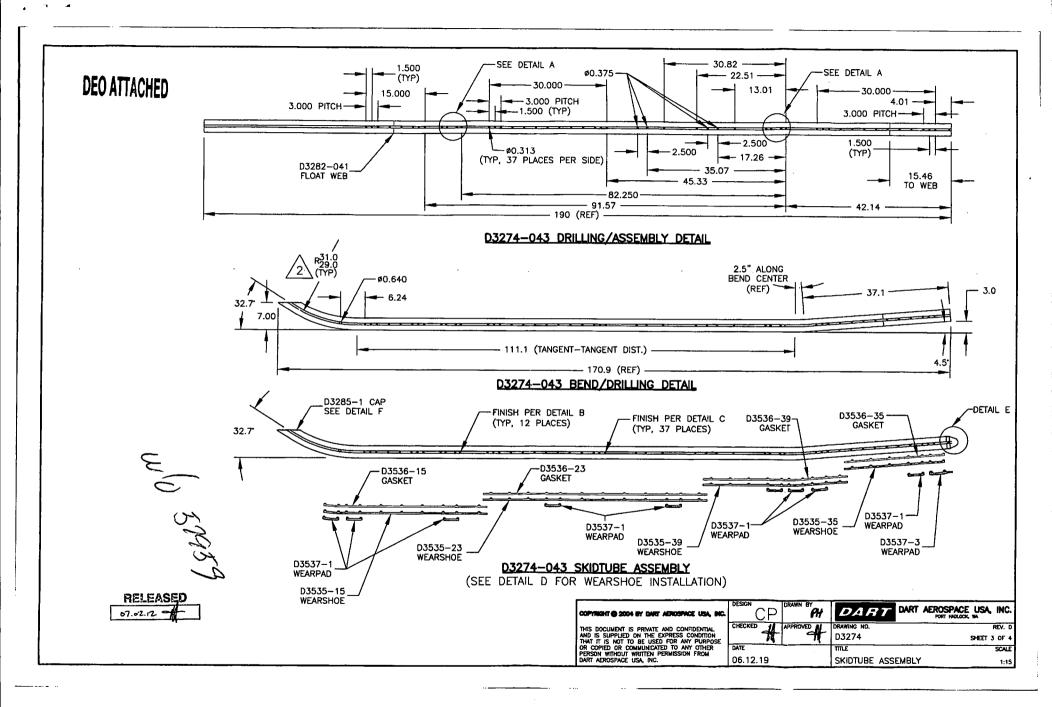
THERE SHOULD BE NO VISIBLE WRINKLES IN THE BEND FROM THE GROUND TO A HEIGHT OF 7 INCHES ABOVE THE GROUND. IT IS ACCEPTABLE TO POLISH OUT GOUGES UP TO 0.020 DEEP IN THE BENT PORTION OF THE TUBE. A MAXIMUM REDUCTION IN DIAMETER OF 0.150" IS ACCEPTABLE IN THE BENT PORTION OF THE TUBE.

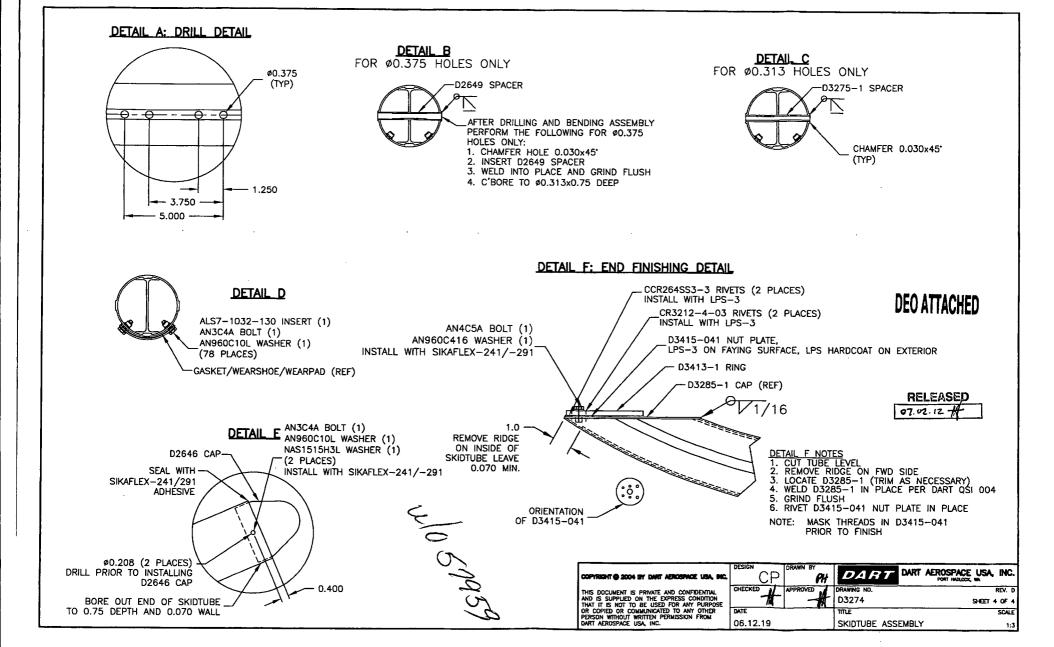
- 3. ALL HOLES DRILLED ON CENTERLINES.
- BOND D3282-041 FLOAT WEB INTO D3274-1/-3 OUTER TUBE WITH NON-STRUCTURAL SIKAFLEX-241/291 ADHESIVE PER DART QSI 015. ENSURE HOLES LINE-UP.
- 5. WELDING TO BE DONE PER DART QSI 004.
- 6. FINISH: ACID ETCH, ALODINE ASSEMBLY PER DART QSI 005 4.1 - POWDER COAT WHITE (REF. 4.3.5.1) PER DART QSI 005 4.3
- 7. DRILL Ø0.297 HOLES FOR ALS7-1032-130 INSERTS USING DT3274-1T2 BEFORE FINISH. INSTALL ALS7-1032-130 INSERTS AFTER FINISH. SEAL WEARSHOE BOLTS WITH SIKAFLEX -241/-291.
- SPRAY INSIDE OF TUBE WITH A COAT OF LPS LABORATORIES "LPS-3" AFTER FINISH AND INSTALLATION
  OF INSERTS. COAT ALL EXPOSED FASTENERS WITH LPS LABORATORIES "LPS PROCYON" AFTER FINAL
  ASSEMBLY, CLEAN EXCESS OFF POWDER COATING WITH MEK DEGREASER.

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DRAWING	NO.	TITLE		REV D D	ART AEROSPACE US	A INC DEC NO	· · · · · · · · · · · · · · · · · · ·	SHEET NO.	SCALE
D3274	i	SKIDTUBE A	ASSEMBLY	1121. 5	ENGINEERING ORD			SHEET 1 OF 1	SCALE 1 NTS
DRAWN	S		CHECKED	B.	MFG. APPR.	APPROVED	JAN	DE APPR.	NIS
DATE	09.06.	17	DATE 09.06	23	DATE 89/06/23	DATE	09/06/23	DATE 09.06.23	

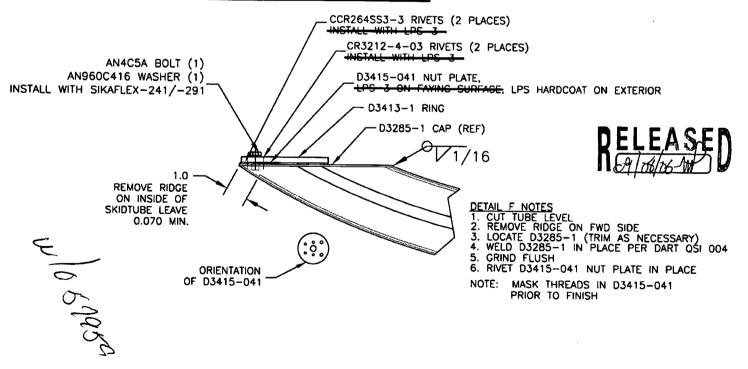
LPS-3 IS NO LONGER USED DURING ASSEMBLY OF SKIDTUBE.

AMEND NOTE 8: "SPRAY INSIDE OF TUBE WITH A COAT OF LPS LABORATORIES 'LPS 3' AFTER FINISH AND INSTALLATION OF INSERTS.

COAT ALL EXPOSED FASTENERS WITH LPS LABORATORIES 'LPS PROCYON' AFTER FINAL ASSEMBLY, CLEAN EXCESS OFF POWDER COATING WITH MEK DEGREASER."

AMEND DETAIL F AS SHOWN:

#### **DETAIL F: END FINISHING DETAIL**



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NO230
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# AWS D17.1.2001 QUALIFICATION TEST RECORD

Name: Barclay Elliatt	
Job number: 57356	_
Part number: Dack-1612 - 541	
Description: Noat tube	
Welding Process: Tig[   Mig[ ]	_
Base materiel: Aluminium	
Current: AC[ ] DC[ ]	_

## TEST REQUIREMENTS AND RESULTS

Visual: Penetration:	pass[   fail[ ] pass[   fail[ ]
UNACCEPTABLE	
Cracks: Undercut: Pin holes: Overlap (cold lap) Porosity (surface): Coloration:	pass[/] fail[] pass[/] fail[] pass[/] fail[] pass[/] fail[] pass[/] fail[] pass[/] fail[]
Qualifier Kod No.	Date of Test Coupon 10.05.05  Date of Test Coupon 10-05-05

The above named individual is qualified in accordance with AWS D17.1.2001 to weld